

**ABSTRACT**

Systems and methods of utilizing communications networks and multivariate analysis to predict or recommend optimal products from a predefined population of commercially available products are disclosed. The recommendations are based on intelligence contained in processing elements and subjective and/or objective product information received from consumers or input to the systems as part of their initial setup. The output of the systems comprise sets of products that they predict the consumer will prefer and/or perform well for the problem or concern identified by the consumer. The performance and preference predictions are a function of consumer problems and product responsiveness patterns. Objective product information is generally obtained with diagnostic instruments. Data measured with the diagnostic instruments may be communicated to the data processing portions of the invention via the Internet. The outputs of the data processing portion of the system may be presented to consumers via the Internet as well.